

## CLAIM OR CLAIMS

### WHAT IS CLAIMED IS:

1. An apparatus for creating a protocol stack comprising:

5                   a protocol layer with a standardized interface; and  
                  an instance for the administration of the protocol stack that contains  
the protocol layer.

10           2. The apparatus as recited in claim 1 wherein the protocol layer comprises a  
description file in which a characteristic of the protocol layer is described.

15           3. The apparatus as recited in claim 2 further comprising means for linking  
the description files of components of the protocol layer with each other.

20           4. The apparatus as recited in claim 1 wherein the instance comprises:  
                  a local emulation manager that is assigned to the protocol layer; and  
                  a global emulation manager that is linked to the local emulation  
manager.

25           5. The apparatus as recited in claim wherein the protocol layer has a Service  
Access Point, with the Service Access Point having an input and/or an output  
to another Service Access Point.

30           6. The apparatus as recited in claim 4 wherein the protocol layer comprises

an input and an output to connect with the local emulation manager.

7. The apparatus as recited in claim 1 wherein the protocol layer is configured to be connected with at least two higher protocol layers and at least two lower protocol layers.

8. The apparatus as recited in claim 2 wherein the characteristic comprises:  
a description of a Service Access Point as a list of primitives that may be exchanged via the Service Access Point; and  
parameters of the protocol layer; and  
actions of the protocol layer.

9. The apparatus as recited in claim 8 wherein the primitives are shown as standardized structures and standardized coding.

10. The apparatus as recited in claim 8 further comprising a communication function for giving the Service Access Point the same form as the instance.

11. The apparatus as recited in claim 1 further comprising an interaction element via which a user interacts with the protocol layer.

12. The apparatus as recited in claim 11 further comprising a script interpreter that is incorporated by the interaction element into the protocol stack so that the user acts on the protocol stack.

13. The apparatus as recited in claim 1 further comprising a graphical user interface for putting together the protocol stack.

14. The apparatus as recited in claim 13 wherein protocol-layer-specific  
5 information is made available via the graphical user interface.

15. The apparatus as recited in claim 14 wherein the protocol-layer-specific information comprises:

adjustable and constant parameters of the protocol layer; and  
10 actions of the protocol layer, the parameters and actions being modifiable by the user.

16. A method of creating a protocol stack comprising the steps of:

making available a protocol layer with a standardized interface;  
15 randomly compiling the protocol stack containing the protocol layer;

and

making available an instance for the administration of the protocol stack.

17. An apparatus for creating a protocol stack comprising:

a plurality of local emulation managers, each local emulation manager being coupled to a protocol layer emulation with the protocol layer emulation having a standardized interface;

a global emulation manager linked to the local emulation managers to

means for interacting with the administration instance to provide administrative commands for loading and connecting elements including the protocol layer emulations to create the protocol stack.